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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---|-------------|----------------------|---------------------------------|------------------------|
| 10/664,805 | 09/19/2003 | Johan Lammens | 600203275-2 | 3472 |
| 22879 7590 09/25/2007 HEWLETT PACKARD COMPANY P O BOX 272400, 3404 E. HARMONY ROAD INTELLECTUAL PROPERTY ADMINISTRATION FORT COLLINS, CO 80527-2400 | | | EXAMINER BURLESON, MICHAEL L | |
| | | | ART UNIT 2625 | PAPER NUMBER |
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/664,805

Applicant(s)

LAMMENS ET AL.

Examiner

Michael Burleson

Art Unit

2625

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-22 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1,6,17,21 and 22 is/are rejected.
- 7) ☒ Claim(s) 2-5,7-16,18-20 is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. ____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s)/Mail Date. ____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date <u>09/19/07</u> . | 6) <input type="checkbox"/> Other: ____ |

DETAILED ACTION

Information Disclosure Statement

1. The information disclosure statement (IDS) was submitted on 09/19/2003. The submission is in compliance with the provisions of 37 CFR 1.97. Accordingly, the information disclosure statement is being considered by the examiner.

Claim Rejections - 35 USC § 101

1. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

2. Claims 21 and 22 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

3. Regarding claim 21, The algorithm claimed is merely a set of instructions per se. Since the algorithm is merely a set of instructions not embodied on a computer readable medium to realize the computer program functionality, the claimed subject matter is non-statutory. See MPEP 2106 IV.B.1.

4. Regarding claim 22, The data storage medium claimed can be anything other than a computer readable medium. Since the data storage medium can be a set of instructions or other type of product not embodied on a computer readable medium to realize the computer program functionality, the claimed subject matter is non-statutory. See MPEP § 2106 IV.B.1.

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1,6 and 17 are rejected under 35 U.S.C. 102(e) as being anticipated by Yamaguchi US 6665434.
3. Regarding claim 1, Yamaguchi teaches of a method of applying a gray neutrality calibration to a color signal, said method comprising: representing said color signal as a position in a multi dimensional color space, in which each said dimension of said color space represents a respective primary color (column 17,lines 9-19). Yamaguchi teaches defining a gray axis in said multi dimensional color space as a set of coordinates for which a plurality of said primary colors each have a same value as each other (column 19,lines 6-37). Yamaguchi teaches determining a distance between said position representing said color signal and said gray axis (column 19,lines 47-54 – column 20,lines 1-17). Yamaguchi teaches using said determined distance between said color signal position and said gray axis to apply a gray neutrality correction to said input color signal (column 21,lines 5-18).

Art Unit: 2625

4. Regarding claim 6, Yamaguchi teaches wherein said primary colors are non-black primary colors (column 13, lines 9-13).
5. Regarding claim 17, Yamaguchi teaches of a printer device (printer 16) for printing image data, said printer device comprising: a printer mechanism having a media transport mechanism, a printer head mechanism and; a print channel capable of inputting a multi dimensional image data (column 15, lines 33-48; printer 16 records image data onto the photographic printing paper 68, it is inherent that printer 16 comprises a printer mechanism, printer head and print channel). Yamaguchi teaches of a multi dimensional lookup table capable of applying a gray neutrality function to said multi dimensional image data, wherein said multi dimensional lookup table is generated by: representing said color signal and said gray axis (column 19, lines 6-37); and using said determined distance between said color signal position (column 19, lines 47-54 – column 20, lines 1-17) and said gray axis to apply a gray neutrality correction to said input color signal (column 21, lines 5-18).

Claim Rejections - 35 USC § 102

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

7. Claims 21 and 22 are rejected under 35 U.S.C. 102(e) as being anticipated by Pop US 7251058.
8. Regarding claim 21, Pop teaches of an algorithm for generating a multi-dimensional look up table, for installation into a printer device for applying a gray neutrality calibration data to a multi-dimensional image data, the algorithm comprising components for: applying said lookup tables to a data input of each of a plurality of color signal channels each carrying a single color data of said multi-dimensional image data (column 43-49 and column 7, lines 60- column 8, lines 1-15). Pop teaches generating an output of said lookup table, such that an input into a said color signal channel for a color combination, which lies upon a gamut surface, remains unaffected by said gray neutrality calibration (column 8, lines 21-54).
9. Regarding claim 22, the structural elements of algorithm claim 21 perform all of the steps of apparatus claim 22. Thus, claim 22 is rejected for the same reasons discussed in the rejection of claim 21.

Allowable Subject Matter

10. Claims 2-5, 7-16 and 18-20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Art Unit: 2625

Conclusion

1. Any inquiry concerning this communication should be directed to Michael Burleson whose telephone number is (571) 272-7460 and fax number is (571) 273-7460. The examiner can normally be reached Monday thru Friday from 8:00 a.m. – 4:30p.m. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Twyler Lamb can be reached at (571) 272-7404.



KIMBERLY WILLIAMS
PRIMARY PATENT EXAMINER

Michael Burleson
Patent Examiner
Art Unit 2625



MIb
September 16, 2007